

AMENDMENT UNDER 37 C.F.R. § 1.111
U.S. APPLN. NO. 10/051,070
ATTORNEY DOCKET NO. Q68238

REMARKS

Applicants request that the Examiner acknowledge Applicants' claim to foreign priority, and to indicate that the certified copy of the priority document, Japanese Patent Application No. Heisei 9-149403 dated June 6, 1997 has been made of record in the file.

Claims 1-6 and 8-25 have been examined on their merits. Claim 7 was previously cancelled in the Preliminary Amendment filed April 23, 2002.

Claims 1-6 and 8-25 are all the claims presently pending in the application.

1. Claims 1-9 and 18-23 stand rejected under 35 U.S.C. § 102(a) as allegedly being anticipated by Uchiyama et al. (U.S. Patent No. 5,575,570). Applicants traverse the rejection of claims 1-9 and 18-23 at least for the reasons set forth below.

To support a conclusion that a claimed invention lacks novelty under 35 U.S.C. § 102, a single source must teach all of the elements of a claim. *Hybritech Inc. v. Monoclonal Antibodies, Inc.*, 802 F.2d 1367, 1379 (Fed. Cir. 1986). A claim is anticipated only if each and every element as set forth in the claim is found either expressly or inherently in a single prior art reference. *Verdegaal Bros. v. Union Oil Co. of California*, 814 F.2d 628, 631 (Fed. Cir. 1987). A single source must disclose all of the claimed elements arranged as in the claim. *Richardson v. Suzuki Motor Co.*, 868 F.2d 1226, 1236 (Fed. Cir. 1989). Rejections under 35 U.S.C. § 102 are proper only when the claimed subject matter is identically disclosed or described in the prior art. Thus, the cited reference must clearly and unequivocally disclose every element and limitation of the claimed invention.

Uchiyama et al. disclose, *inter alia*, a cage for a rolling bearing. The cage is molded from a resin material and then immersed in lubricating oil in order to impregnate the lubricating oil into the resin cage. *See* col. 5, lines 36-40; col. 6, lines 20-30 of Uchiyama et al. Preferably, the cage has an oil content of 0.2% to 15% by weight, wherein oil content means the percentage of the weight of the impregnated oil based on the dry weight of the cage prior to the oil infiltration. *See* col. 5, lines 61-66 of Uchiyama et al.

Uchiyama et al. fail to teach or suggest a bearing with a sole lubricant consisting of lubricating oil directly injected into a to-be-sealed bearing space defined between bearing space sealing members, wherein the amount of the lubricating oil is in a range of 1 to 50% by volume of the to-be-sealed bearing space, as recited in claim 1. The language of claim 1 specifies that the amount of lubricating oil injected into the bearing is based upon the volume of the bearing space defined by the sealing members. In contrast, Uchiyama et al. disclose that the amount of lubricating oil used in a rolling bearing is based upon the amount of oil impregnated into the rolling element cage. While the Examiner argues that the cage oil percentages are considered to generate volume percentages that overlap the teaching of Uchiyama, the Examiner is ignoring the plain language of claim 1, which requires that the lubricating oil be injected into the to-be-sealed bearing space. In Uchiyama et al., the lubricating oil is already contained in the rolling element cage, and injection of lubricating oil into a to-be-sealed bearing space is neither taught nor suggested.

Moreover, the fact that a certain characteristic may occur or be present in the prior art is not enough to establish the inherency of that characteristic. *In re Rijckaert*, 9 F.3d 1531, 1534 (Fed. Cir. 1993). In order to establish inherency, extrinsic evidence must make clear that the missing

descriptive matter is necessarily present in the reference and that persons of ordinary skill would so recognize. *In re Robertson*, 169 F.3d 743, 745 (Fed. Cir. 1999). Inherency cannot be established by probabilities or possibilities, and the fact that a certain thing may result from a given set of circumstances is insufficient to establish inherency. *Id.* Moreover, the Examiner is required to provide a basis in fact and/or technical reasoning to support his argument that the inherent characteristics are present in the teachings of the applied reference. *Ex parte Levy*, 17 U.S.P.Q.2d 1461, 1464 (Bd. Pat. App. & Inter. 1990). The Examiner's inherency argument with respect to the cage oil percentages lacks any factual or technical reasoning of how the lubricating oil impregnated in the rolling element cage of Uchiyama et al. meets the volume requirements for lubricating oil injected into the to-be-sealed bearing space. As is plainly stated in the instant specification, the lubricating oil injected into the bearing space is different than the lubricating oil impregnated in the rolling element cage. *See* page 9, lines 8-12 of the instant specification. Based on the foregoing reasons, Applicants believe that Uchiyama et al. do not clearly anticipate all the recitations of claim 1, as required by *Hybritech* and *Richardson*.

Thus, Applicants believe that claim 1 is allowable over Uchiyama et al., and further believe that claims 2-6 and 8 are allowable as well, at least by virtue of their dependency from claim 1.

Claim 9 has recitations that are similar to claim 1, namely a bearing with a sole lubricant consisting of lubricating oil directly injected into a to-be-sealed bearing space defined between bearing space sealing members, wherein the amount of the lubricating oil is in a range of 1 to 50% by volume of the to-be-sealed bearing space. Applicants believe that Uchiyama et al. do not clearly

anticipate all the recitations of claim 9 for the same reasons set forth above with respect to claim 1.

Therefore, Applicants believe that claim 9 is allowable over Uchiyama et al.

Claim 22 has recitations that are similar to claim 1, namely a bearing with a sole lubricant consisting of lubricating oil directly injected into a to-be-sealed bearing space defined between bearing space sealing members, wherein the amount of the lubricating oil is in a range of 1 to 50% by volume of the to-be-sealed bearing space. Applicants believe that Uchiyama et al. do not clearly anticipate all the recitations of claim 22 for the same reasons set forth above with respect to claim 1. Therefore, Applicants believe that claim 22 is allowable over Uchiyama et al.

Claim 23 has recitations that are similar to claim 1, namely a bearing with a sole lubricant consisting of lubricating oil directly injected into a to-be-sealed bearing space defined between bearing space sealing members, wherein the amount of the lubricating oil is in a range of 1 to 50% by volume of the to-be-sealed bearing space. Applicants believe that Uchiyama et al. do not clearly anticipate all the recitations of claim 23 for the same reasons set forth above with respect to claim 1. Therefore, Applicants believe that claim 23 is allowable over Uchiyama et al.

For claim 18, Uchiyama et al. fail to teach or suggest a bearing comprising a lubricating oil contained in a sealed bearing space defined between sealing members, wherein the amount of the lubricating oil is in a range of 1 to 50% by volume of the bearing space. The language of claim 18 specifies that the amount of lubricating oil injected into the bearing is based upon the volume of the bearing space defined by the sealing members. In contrast, Uchiyama et al. disclose that the amount of lubricating oil used in a rolling bearing is based upon the amount of oil impregnated into the rolling element cage. Again, while the Examiner argues that the cage oil percentages are considered

to generate volume percentages that overlap the teaching of Uchiyama, the Examiner is ignoring the plain language of claim 18, which requires that the lubricating oil be injected into the to-be-sealed bearing space. As noted above, the Examiner's inherency argument with respect to the cage oil percentages lacks any factual or technical reasoning of how the lubricating oil impregnated in the rolling element cage of Uchiyama et al. meets the volume requirements for lubricating oil injected into the to-be-sealed bearing space. In Uchiyama et al., the lubricating oil is already contained in the rolling element cage, and injection of lubricating oil into a to-be sealed bearing space is neither taught nor suggested. Based on the foregoing reasons, Applicants believe that Uchiyama et al. do not clearly anticipate all the recitations of claim 18, as required by *Hybritech* and *Richardson*, and thus, claim 18 is allowable over Uchiyama et al.

Claim 19 has recitations that are similar to claim 18, namely a bearing comprising a lubricating oil contained in a sealed bearing space defined between sealing members, wherein the amount of the lubricating oil is in a range of 1 to 50% by volume of the bearing space. Applicants believe that Uchiyama et al. do not clearly anticipate all the recitations of claim 19 for the same reasons set forth above with respect to claim 18. Therefore, Applicants believe that claim 19 is allowable over Uchiyama et al.

Claim 20 has recitations that are similar to claim 18, namely a bearing comprising a lubricating oil contained in a sealed bearing space defined between sealing members, wherein the amount of the lubricating oil is in a range of 1 to 50% by volume of the bearing space. Applicants believe that Uchiyama et al. do not clearly anticipate all the recitations of claim 20 for the same

reasons set forth above with respect to claim 18. Therefore, Applicants believe that claim 20 is allowable over Uchiyama et al.

2. Claims 10-17, 24 and 25 stand rejected under 35 U.S.C. § 103(a) as allegedly being unpatentable over Uchiyama et al. in view of the Examiner's Official Notice of common knowledge in the art. Applicants traverse the rejection of claims 10-17, 24 and 25 at least for the reasons set forth below.

The initial burden of establishing that a claimed invention is *prima facie* obvious rests on the USPTO. *In re Piasecki*, 745 F.2d 1468, 1472 (Fed. Cir. 1984). To make its *prima facie* case of obviousness, the USPTO must satisfy three requirements:

1. The prior art relied upon, coupled with the knowledge generally available in the art at the time of the invention, must contain some suggestion or incentive that would have motivated to artisan to modify a reference or to combine references. *In re Fine*, 837 F.2d 1071, 1074 (Fed. Cir. 1988).
2. The proposed modification of the prior art must have had a reasonable expectation of success, and that determined from the vantage point of the artisan at the time the invention was made. *Amgen, Inc. v. Chugai Pharm. Co.*, 927 F.2d 1200, 1209 (Fed. Cir. 1991).
3. The prior art reference or combination of references must teach or suggest all the limitations of the claims. *In re Vaeck*, 20 U.S.P.Q.2d 1438, 1442 (Fed. Cir. 1991); *In re Wilson*, 424 F.2d 1382, 1385 (CCPA 1970).

The motivation, suggestion or teaching may come explicitly from statements in the prior art,

the knowledge of one of ordinary skill in the art, or, the nature of a problem to be solved. *In re Dembiczak*, 175 F.3d 994, 999 (Fed. Cir. 1999). Alternatively, the motivation may be implicit from the prior art as a whole, rather than expressly stated. *Id.* Regardless if the USPTO relies on an express or an implicit showing of motivation, the USPTO is obligated to provide particular findings related to its conclusion, and those findings must be clear and particular. *Id.* A broad conclusionary statement, standing alone without support, is not “evidence.” *Id.*; *see also, In re Zurko*, 258 F.3d 1379, 1386 (Fed. Cir. 2001).

In addition, a rejection cannot be predicated on the mere identification of individual components of claimed limitations. *In re Kotzab*, 217 F.3d 1365, 1371 (Fed. Cir. 2000). Rather, particular findings must be made as to the reason the skilled artisan, with no knowledge of the claimed invention, would have selected these components for combination in the manner claimed. *Id.*

Applicants traverse the Examiner’s reliance of Official Notice of common knowledge in the art. It is not appropriate for the Examiner to take Official Notice of facts without citing a prior art reference where the facts asserted to be well known are not capable of instant and unquestionable demonstration as being well-known. It is never appropriate to rely solely on “common knowledge” in the art without evidentiary support in the record. *See In re Zurko*, 258 F.3d at 1385; MPEP § 2144.03(A). The Examiner states in the March 11, 2003 Office Action that it would have been obvious to one of skill in the art to provide a ball bearing in a hard disk drive. To the extent that the Examiner’s Official Notice extends beyond that statement from the March 11, 2003 Office Action, Applicants traverse the Official Notice and note that the Examiner has not cited any prior art that

discloses a bearing comprising an amount of lubricating oil that is directly injected into a to-be-sealed bearing space, and wherein the amount of lubricating oil to be injected is based on the volume of the to-be-sealed bearing space.

The combination of Uchiyama et al. and common knowledge in the art fails to teach or suggest a bearing with a sole lubricant consisting of lubricating oil directly injected into a to-be-sealed bearing space defined between bearing space sealing members, wherein the amount of the lubricating oil is in a range of 1 to 50% by volume of the to-be-sealed bearing space, as recited in claim 10. The language of claim 10 specifies that the amount of lubricating oil injected into the bearing is based upon the volume of the bearing space defined by the sealing members. In contrast, the combination of Uchiyama et al. and common knowledge in the art discloses that the amount of lubricating oil used in a rolling bearing is based upon the amount of oil impregnated into the rolling element cage. While the Examiner argues that the combination of Uchiyama et al. and common knowledge in the art discloses the lubricating oil volume percentages, the Examiner is ignoring the plain language of claim 10, which requires that the lubricating oil be injected into the to-be-sealed bearing space. In the combination of Uchiyama et al. and common knowledge in the art, the lubricating oil is already contained in the rolling element cage, and injection of lubricating oil based on bearing space volume is neither taught nor suggested. Based on the foregoing reasons, Applicants believe that Examiner has not met the “all limitations” prong of a *prima facie* case of obviousness, as required by *In re Vaeck*.

The Examiner has not provided any clear and particularized findings with respect to motivation to combine Uchiyama et al. with common knowledge in the art, as required by *In re*

Dembiczak and *In re Zurko*. Since the Examiner has not provided any reasoning whatsoever with respect to motivation to combine, Applicants believe that Examiner has not met the motivation prong of a *prima facie* case of obviousness.

Thus, Applicants believe that claim 10 is allowable, and further believe that claims 11-17 are allowable as well, at least by virtue of their dependency from claim 10.

Claim 24 has recitations that are similar to claim 10, namely a bearing with a sole lubricant consisting of lubricating oil directly injected into a to-be-sealed bearing space defined between bearing space sealing members, wherein the amount of the lubricating oil is in a range of 1 to 50% by volume of the to-be-sealed bearing space. Applicants believe that the combination of Uchiyama et al. and common knowledge in the art does not render the recitations of claim 24 obvious for the same reasons set forth above with respect to claim 10. Therefore, Applicants believe that claim 24 is allowable over the combination of Uchiyama et al. and common knowledge in the art.

Claim 25 has recitations that are similar to claim 10, namely a bearing with a sole lubricant consisting of lubricating oil directly injected into a to-be-sealed bearing space defined between bearing space sealing members, wherein the amount of the lubricating oil is in a range of 1 to 50% by volume of the to-be-sealed bearing space. Applicants believe that the combination of Uchiyama et al. and common knowledge in the art does not render the recitations of claim 25 obvious for the same reasons set forth above with respect to claim 10. Therefore, Applicants believe that claim 25 is allowable over the combination of Uchiyama et al. and common knowledge in the art.

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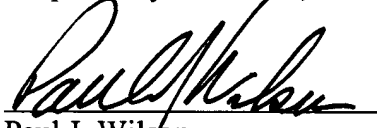
3. Claims 1-24 stand rejected under the judicially-created doctrine of obviousness-type double patenting as being unpatentable over claims 1-13 of U.S. Patent No. 6,340,224.

Applicants are concurrently filing a Terminal Disclaimer with this Amendment, and respectfully request withdrawal of the obviousness-type double patenting rejection of claims 1-24.

In view of the above, reconsideration and allowance of this application are now believed to be in order, and such actions are hereby solicited. If any points remain in issue which the Examiner feels may be best resolved through a personal or telephone interview, the Examiner is kindly requested to contact the undersigned at the telephone number listed below.

The USPTO is directed and authorized to charge all required fees, except for the Issue Fee and the Publication Fee, to Deposit Account No. 19-4880. Please also credit any overpayments to said Deposit Account.

Respectfully submitted,


Paul J. Wilson
Registration No. 45,879

SUGHRUE MION, PLLC
Telephone: (202) 293-7060
Facsimile: (202) 293-7860

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PATENT TRADEMARK OFFICE

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